APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/822,428	04/12/2004	Rafael Storz	21295.79 (H5786US)	2551

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HOUSTON ELISEEVA
4 MILITIA DRIVE, SUITE 4
LEXINGTON, MA 02421

EXAMINER
LIN, JERRY

ART UNIT	PAPER NUMBER
1631	

DATE MAILED: 09/26/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)
	10/822,428	STORZ ET AL.
Office Action Summary	Examiner	Art Unit	
	Jerry Lin	1631	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
  Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *12 April 2004*.

2a)☐ This action is **FINAL**.   2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-16* is/are pending in the application.

    4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-16* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a)☒ All   b)☐ Some * c)☐ None of:

      1.☒ Certified copies of the priority documents have been received.

      2.☐ Certified copies of the priority documents have been received in Application No. _____.

      3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1)☒ Notice of References Cited (PTO-892)
2)☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3)☒ Information Disclosure Statement(s) (PTO/SB/08)
    Paper No(s)/Mail Date *1 page (4/12/04)*.

4)☐ Interview Summary (PTO-413)
    Paper No(s)/Mail Date. _____ .
5)☐ Notice of Informal Patent Application
6)☐ Other: _____ .

U.S. Patent and Trademark Office

PTOL-326 (Rev. 08-06)   Office Action Summary   Part of Paper No./Mail Date 20060919

DETAILED ACTION

Priority

1.   Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which

papers have been placed of record in the file.

Claim Rejections - 35 USC § 112

2.   The following is a quotation of the second paragraph of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3.   Claims 1-16 are rejected under 35 U.S.C. 112, second paragraph, as being

indefinite for failing to particularly point out and distinctly claim the subject matter which

applicant regards as the invention.

4.   Claim 1 recites the limitation of "channel." It is unclear what is meant by

"channel." One interpretation is that a "channel" is a particular data stream. Another

interpretation is that a "channel" is a particular detection device. For purposes of this

office action, the latter interpretation will be used.

5.   Claim 9 recites a "selection means." It is unclear what the "selection means" is

selecting. There is no mention of selecting in Claim 1 or in the instant claim. In light of

the specification, this will be interpreted to mean separating the different emissions from

the fluorescent dyes.

6.   Claim 11 recites an "SP module." The term "SP module" appears to be an

abbreviation that is not defined in the specification of in the instant claim. The term is

also not an accepted term in the art. The specification does mention that a mirror stop

arrangement, the means for spectral spatial division, focusing optical system and detectors are one embodiment of an SP module (specification, page 6). However, this only provides one embodiment of the term and not a definition.

Claim Rejections - 35 USC § 102 .

7.   The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

8.   Claims 1- 3, 5, 6, 8, 9, 11-15 are rejected under 35 U.S.C. 102(b) as being anticipated by Lybarger et al. (Cytometry (1998) Volume 31, pages 147-152).

The instant claims are drawn to a method of detecting emissions from fluorescent dyes by providing a sample with at least two fluorescent dyes, determining the emission spectrum of the dyes, determining the separation points of the emission spectrum in terms of wavelength, and adjusting the separation of two channels to detect the different emissions.

Regarding claim 1, Lybarger et al. teach a method wherein a sample with two fluorescent dyes are provided (page 148, left column, top paragraph); determining the emission spectrum of the dyes where they are excitable at a wavelengths that do not exceed the number of dyes (page 149); determining the separation points of the emission spectrum in terms of wavelength to allocate the corresponding portion of the emission spectrum to a specific channel (page 149; page 151, right column); adjusting

the separation of the channels so that the emission are conveyed to different channels (page 148, right column, bottom; page 149, left column, bottom).

Regarding claim 2, Lybarger et al. teach wherein the separation points of the portions of emission spectrum are defined by the intersection points (page 149).

Regarding claim 3, Lybarger et al. teach wherein the separation points are determined by obtaining the difference between the measured emission spectrum of the biological sample and an emission spectrum at one excitation wavelength (page 149).

Regarding claims 5, 6 and 8, Lybarger et al. teach wherein there is at least one detector element such as a photomultiplier (FACS Vantage includes several dectectors) (page 148, under Materials and Methods, right column bottom).

Regarding claims 9, Lybarger et al. teach providing a selection means (page 148, right column, bottom).

Regarding claims 11 and 12, Lybarger et al. teach using a system that includes mirror stop arrangement, the means for spectral spatial division, focusing optical system and detectors (SP module) (page 148).

Regarding claims 13 and 14, Lybarger et al. teach wherein the separation points are determined with a computer system that displayed the separation points (FACS Vantage) (page 148, right column bottom; page 149).

Regarding claim 15, Lybarger et al. teach where the user adjusts the mirror stop arrangement based on the data (page 151, right column, bottom).

Claim Rejections - 35 USC § 103

9.   The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of

the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of

the various claims was commonly owned at the time any inventions covered therein

were made absent any evidence to the contrary. Applicant is advised of the obligation

under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was

not commonly owned at the time a later invention was made in order for the examiner to

consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g)

prior art under 35 U.S.C. 103(a).

10.   Claim 16 is rejected under 35 U.S.C. 103(a) as being unpatentable over Lybarger

et al. (Cytometry (1998) Volume 31, pages 147-152).

According to the MPEP Section 2106, Part VI, "merely using a computer to

automate a known process does not by itself impart nonobviousness to the invention.

See Dann v. Johnston, 425 U.S. 219, 227-30, 189 USPQ 257, 261 (1976); In re Venner,

262 F.2d 91, 95, 120 USPQ 193, 194 (CCPA 1958)." Claim 16 is a merely computer

automations of claim 15. Thus, it would be obvious to one skilled in the art to use a

computer to automate the known processes disclosed by Lybarger et al.

Contact Information

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jerry Lin whose telephone number is (571) 272-2561. The examiner can normally be reached on 10:00am-6:30pm M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Andrew Wang, can be reached on (571) 272-0811. The fax phone number for the organization where this application or proceeding is assigned is (571) 273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). Representatives are available to answer your questions daily from 6 am to midnight (EST). When calling please have your application serial or patent number, the type of document you are having an image problem with, the number of pages and the specific nature of the problem. The Patent Electronic Business Center will notify applicants of the resolution of the problem within 5-7 business days. Applicants can also check PAIR to confirm that the problem has been corrected. The USPTO's Patent Electronic Business Center is a complete service center supporting all patent business on the Internet. The USPTO's PAIR system provides Internet-based access to patent application status and history information. It

also enables applicants to view the scanned images of their own application file

folder(s) as well as general patent information available to the public.

For all other customer support, please call the USPTO Call Center at (800) 786-9199.

MICHAEL BORIN, PH.D
PRIMARY EXAMINER

JL